Amendments to the Claims:

This listing of claims will replace all prior versions and listings of claims in the application:

Listing of Claims:

1.   (CURRENTLY AMENDED) A method of obtaining printed instances of a document, the method comprising

distributing copies of electronic document data to document processors, the electronic document data containing instructions for printing each instance from a respective one of the document processors;

including a definition of a user data input field in the electronic document data, for receiving a user defined string of characters entered in said field;

including an embedded program of instructions at least partly based on user-defined input information embedded in the electronic document data, linked to the user data input field, the embedded program being distributed in the copies of the electronic document data, the embedded program of instructions comprising:

instructions to cause a processor to receive the user defined string of characters from the user data input field, instructions to control processing by the processor of the user defined string, instructions to derive , wherein the embedded instructions generate commands to print geometrical elements of a bar code, that represent a series of codewords derived by the embedded instructions from the characters in the user defined string, the instructions of the embedded program using the derived codewords to generate commands to print geometrical elements of a bar code, the geometrical elements

representing each codeword ~~being represented~~ as a respective configuration of printed geometrical elements and their background in a respective area of the bar code.

2.   (PREVIOUSLY PRESENTED) A method according to Claim 1, wherein the embedded instructions are arranged to make at least one of the configurations dependent on a further factor other than the codeword represented by the configuration that will be decoded upon decoding the barcode.

3.   (PREVIOUSLY PRESENTED) A method according to Claim 1, wherein the embedded instructions make the configurations dependent on the specific area in which the codeword is represented, so that mutually different configurations will result from representing a specific codeword dependent on whether the specific codeword is represented in one region or another.

4.   (PREVIOUSLY PRESENTED) A method as claimed in Claim 3, wherein the embedded instructions are arranged to control printing of the barcode as a two dimensional barcode, at least part of the areas having mutually different shapes, the embedded instructions adapting the commands to print the elements of the configuration that is used to represent a codeword according to the shape of the area in which the codeword is represented.

5.   (PREVIOUSLY PRESENTED) A method as claimed in Claim 3, wherein the embedded instructions are arranged to include additional information in the areas, the additional information being independent of the codewords represented in the areas, the additional information being included by adding geometrical elements, removing geometrical elements and/or modifying visual properties of part of the geometrical elements that represent at least one of the codewords, dependent on the area in which the codeword is represented in a way that does not affect a decoded result when the barcode is decoded after scanning.

6.   (PREVIOUSLY PRESENTED) A method as claimed in Claim 4, wherein the embedded instructions are arranged to print additional geometrical elements that extend from within a region that is defined by all geometrical elements that will be used to decode the barcode in the printed document, to outside said region among further printed items of the document, so that the additional geometrical elements do not affect a decoded result when the barcode is scanned and decoded.

7.   (PREVIOUSLY PRESENTED) A method as claimed in Claim 4, wherein the geometrical elements each have a property that does not affect the decoded data, the embedded instructions being arranged to set said property in different ones of the geometrical elements in at least one area that represents a codeword differently during printing.

8.   (PREVIOUSLY PRESENTED) A method as claimed in Claim 7, wherein the embedded instructions are arranged to select a color and/or grey level density of different geometrical elements differently, as a predetermined function of position in an area where the barcode is printed.

9.   (CURRENTLY AMENDED) A electronic document processor, comprising a user data input device and a connection for a printer, the electronic document processor having a loaded electronic form that contains a definition of a user data entry field for receiving a string of input characters from a user, the processor being arranged to extract and execute ~~instructions at least partly based on user-defined input information embedded in the electronic form from~~ an embedded program of instructions that ~~it~~ the processor receives embedded in the document, the embedded program ~~instructions~~ being linked to the user data input field, instructions of the embedded program being configured to cause the processor to derive a series of codewords from the string and to generate ~~wherein the embedded instructions generate~~ ~~for generating~~ commands to print geometrical elements of a bar code ~~that encodes a series of codewords derived by the embedded instructions from the characters in the string~~, dependent on the derived codewords, the

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instructions causing the processor to represent ~~each codeword represented~~ as a configuration of printed geometrical elements and their background in a respective area of the bar code.

10. (PREVIOUSLY PRESENTED) An electronic document processor as claimed in Claim 9, wherein the embedded instructions are arranged to make at least one of the configurations dependent on a further factor other than the codeword represented by the configuration that will be decoded upon decoding the barcode.

11. (PREVIOUSLY PRESENTED) An electronic document processor as claimed in Claim 9, wherein the embedded instructions make the configurations dependent on the specific area in which the codeword is represented, so that mutually different configurations will result to represent a specific codeword dependent on whether the specific codeword is represented in one region or another.

12. (PREVIOUSLY PRESENTED) An electronic document processor as claimed in Claim 11, wherein the embedded instructions are arranged to control printing of the barcode as a two dimensional barcode, at least part of the areas having mutually different shapes, the embedded instructions adapting the commands to print the elements of the configuration that is used to represent a codeword according to the shape of the area in which the codeword is represented.

13. (PREVIOUSLY PRESENTED) An electronic document processor as claimed in Claim 11, wherein the embedded instructions are arranged to include additional information in the areas, the additional information being independent of the codeword represented in the areas, the additional information being included by adding geometrical elements, removing geometrical elements and/or modifying visual properties of part of the geometrical elements that represent at least one of the codewords, dependent on the area in which the codeword is represented in a way that does not affect a decoded result when the barcode is scanned and decoded.

14.   (PREVIOUSLY PRESENTED) An electronic document processor as claimed in Claim 13, wherein the embedded instructions are arranged to print additional geometrical elements that extend from within a region that is defined by all geometrical elements that will be used to decode the barcode in the printed document, to outside said region among further printed items of the document, so that the additional geometrical elements do not affect a decoded result when the barcode is scanned and decoded.

15.   (PREVIOUSLY PRESENTED) An electronic document processor as claimed in Claim 13, wherein the geometrical elements each have a property that does not affect the decoded data, the embedded instructions being arranged to set said property in different ones of the geometrical elements in at least one area that represents a codeword differently during printing.

16.   (PREVIOUSLY PRESENTED) An electronic document processor as claimed in Claim 15, wherein the embedded instructions are arranged to select a color and/or grey level density of different geometrical elements differently, as a predetermined function of position in an area where the barcode is printed.

17.   (CURRENTLY AMENDED) An electronic form stored on a computer that contains a definition of a user data entry field for receiving a string of input characters from a user and an embedded program of instructions at least partly based on user defined input information embedded in the electronic form and linked to the user data input field, wherein embedded instructions of the embedded program are configured to cause a processor to derive a series of codewords from the characters in the string and generate for generating commands to print geometrical elements of a bar code, that represents a series of codewords derived by the embedded instructions from the characters in the string, dependent on the codewords, representing each codeword represented as a configuration of printed geometrical elements and their background in a respective area of the bar code.

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18.   (PREVIOUSLY PRESENTED) An electronic form according to Claim 17, wherein the embedded instructions are arranged to make at least one of the configurations dependent on a further factor other than the codeword represented by the configuration that will be decoded upon decoding the barcode.

19.   (PREVIOUSLY PRESENTED) An electronic form according to Claim 17, wherein the embedded instructions make the configurations dependent on the specific area in which the codeword is represented, so that mutually different configurations will result from representing a specific codeword dependent on whether the specific codeword is represented in one region or another.

20.   (PREVIOUSLY PRESENTED) An electronic form as claimed in Claim 19, wherein the embedded instructions are arranged to control printing of the barcode as a two dimensional barcode, at least part of the areas having mutually different shapes, the embedded instructions adapting the commands to print the elements of the configuration that is used to represent a codeword according to the shape of the area in which the codeword is represented.

21.   (PREVIOUSLY PRESENTED) An electronic form as claimed in Claim 19, wherein the embedded instructions are arranged to include additional information in the areas, the additional information being independent of the codewords that are represented in the areas, the additional information being included by adding geometrical elements, removing geometrical elements and/or modifying visual properties of part of the geometrical elements that represent at least one of the codewords, dependent on the area in which the codeword is represented in a way that does not affect a decoded result when the barcode is scanned and decoded.

22.   (PREVIOUSLY PRESENTED) An electronic form as claimed in Claim 21, wherein the embedded instructions are arranged to print additional geometrical elements that extend from within a region that is defined by all geometrical elements that will be used to decode the in the

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printed document, to outside said region among further printed items of the document, so that the additional geometrical elements do not affect a decoded result when the document is scanned and decoded.

23.   (PREVIOUSLY PRESENTED) An electronic form as claimed in Claim 21, wherein the geometrical elements each have a property that does not affect the decoded data, the embedded instructions being arranged to set said property in different ones of the geometrical elements in at least one area that represents a codeword differently during printing.

24.   (PREVIOUSLY PRESENTED) An electronic form as claimed in Claim 23, wherein the embedded instructions are arranged to select a color and/or grey level density of different geometrical elements differently, as a predetermined function of position in an area where the barcode is printed.

25.   (PREVIOUSLY PRESENTED) A machine readable medium, comprising an electronic form stored on a computer according to Claim 17.

26.   (CURRENTLY AMENDED) A method of authoring an electronic document, the method comprising:

including a definition of a field for entering a string of characters in the document;

providing software building blocks for building a program of instructions at least partly based on user defined input information embedded in the electronic document, the embedded program of instructions being configured to cause a processor to receive and process the string of characters from said field to transform the characters into generating commands to print geometrical elements of a bar code, so that the generated bar code is decodable according to a predetermined standard,;

assembling the building blocks into the <u>electronic document</u> ~~embedded instructions~~ during authoring of the document, while adapting the embedded <u>program of</u> instructions to make a visual aspect of the bar codes generated under control of the embedded instructions specific to the document and/or the field, without affecting a result of decoding the bar code<u>;</u>

<u>distributing copies of the electronic document with the embedded program of instructions for receiving and processing the string of characters under control of the embedded program after distribution.</u>

27.   (CURRENTLY AMENDED) A document authoring machine, for generating an electronic document that includes a field for entering a string of characters and<u> an embedded program of</u> instructions ~~at least partly based on user-defined input information~~ embedded in the electronic document and linked to the field, wherein the embedded <u>program of</u> instructions <u>is</u> <u>configured to cause a processor to receive and process the string of characters and to</u> generate commands to print geometrical elements of a bar code, the machine comprising software building blocks for building the embedded program so that the generated bar code is decodable according to a predetermined standard, and an editor for assembling the building blocks when the document is authored, the editor providing for adaption of the embedded instructions to make a visual aspect of the bar codes generated under control of the embedded instructions specific to the document and/or the field, without affecting a result of decoding the bar code.

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